

WHAT IS CLAIMED IS:

1 1. A system for binding sheets into bound text bodies having respective
2 spines exposed for adhesive application and characterized by multiple length
3 dimensions and multiple thickness dimensions, the system comprising:
4 an adhesive dispenser configured to dispense across the thickness dimension
5 of a text body spine solid sheet adhesive having one of multiple effective widths
6 sized to correspond substantially to the length dimension of the text body spine.

1 2. The system of claim 1, wherein the adhesive dispenser is configured to
2 dispense multiple segments of solid sheet adhesive along the length dimension of the
3 text body spine.

1 3. The system of claim 2, wherein the adhesive dispenser is configured to
2 dispense solid sheet adhesive segments of different widths.

1 4. The system of claim 2, wherein the adhesive dispenser is configured to
2 dispense solid sheet adhesive segments of the same width.

1 5. The system of claim 2, wherein the adhesive dispenser is configured to
2 dispense at least one solid sheet adhesive segment independently of the other solid
3 sheet adhesive segments.

1 6. The system of claim 5, wherein the adhesive dispenser comprises a
2 roller system for dispensing the multiple segments of solid sheet adhesive.

1 7. The system of claim 6, wherein the roller system comprises a drive
2 shaft supporting multiple drive rollers.

1 8. The system of claim 7, wherein the adhesive dispenser comprises a
2 motor for driving the drive shaft, and a clutch disposed between a pair of drive
3 rollers enables one or both drive rollers of the drive roller pair to be driven
4 selectively by the motor.

1 9. The system of claim 2, further comprising an adhesive quantity
2 interrogator configured to obtain indications of the length of each solid sheet
3 adhesive segment remaining in a plug-in cartridge housing.

1 10. The system of claim 9, further comprising a controller configured to
2 transmit a warning message when any of the solid sheet adhesive segments is nearly
3 spent.

1 11. The system of claim 2, wherein the adhesive dispenser is configured to
2 dispense multiple segments of solid sheet adhesive along the length dimension of the
3 text body spine simultaneously.

1 12. The system of claim 2, wherein the adhesive dispenser is configured to
2 dispense multiple segments of solid sheet adhesive along the length dimension of the
3 text body spine sequentially.

1 13. The system of claim 12, wherein the adhesive dispenser is configured
2 to position a plug-in cartridge housing containing a roll of solid sheet adhesive at
3 multiple locations along the length dimension of the text body spine.

1 14. The system of claim 1, wherein the adhesive dispenser comprises a
2 width cutter for cutting solid sheet adhesive to an effective width substantially
3 corresponding to the length dimension of the text body spine.

1 15. The system of claim 14, wherein the adhesive dispenser further
2 comprises a length cutter for cutting the solid sheet adhesive to a length at least as
3 large as the thickness dimension of the text body spine.

1 16. The system of claim 15, wherein the adhesive dispenser is configured
2 to advance the solid sheet adhesive beyond the location cut by the width cutter, and
3 to cut across the solid sheet adhesive with the length cutter to prepare a clean
4 leading edge for a subsequent sheet binding.

1 17. The system of claim 14, wherein the adhesive dispenser comprises a
2 waste reservoir configured to store excess solid sheet adhesive cut by the width
3 cutter.

1 18. A method of binding sheets into bound text bodies having respective
2 spines exposed for adhesive application and characterized by multiple length
3 dimensions and multiple thickness dimensions, the method comprising:
4 dispensing across the thickness dimension of a text body spine solid sheet
5 adhesive having one of multiple effective widths sized to correspond substantially to
6 the length dimension of the text body spine.

1 19. The method of claim 17, wherein multiple segments of solid sheet
2 adhesive are dispensed along the length dimension of the text body spine.

1 20. The method of claim 17, wherein solid sheet adhesive is cut to an
2 effective width substantially corresponding to the length dimension of the text body
3 spine.